

In the Specification

Please add new paragraph [0010.5] shown below.

SUMMARY OF THE INVENTION

[0010.5] Template patterns in accordance with the present invention can include one or more marker-zones printed to a reference surface of a disk for determining gross-position along a stroke of a read head connected with a rotary actuator. The one or more marker-zones can be printed or otherwise written to a portion of the reference surfaces as one or more pulses. In one embodiment, each pulse can trace the motion of the stroke along at least a portion of the radius of the reference surface. A pulse can identify a marker-zone edge when a di-bit (a transition pair representing a pulse) disappears at some radius from center of the disk. At a radius closer to the center of the disk, the di-bit can abruptly reappear so that the pulse is continued. The interruption in the radial continuity of the magnetized pulse defines the marker-zone and can be any length.

Please add new paragraph [0012] shown below.

[0012] A rotary actuator 130 is pivotally mounted to the housing base 104 by a bearing 132 and sweeps an arc between an inner diameter (ID) of the disk and a ramp 130 150 positioned near an outer diameter (OD) of the disk 108. Attached to the housing 104 are upper and lower magnet return plates 110 and at least one magnet that together form the stationary portion of a voice coil motor (VCM) 112. A voice coil 134 is mounted to the rotary actuator 130 and positioned in an air gap of the VCM 112. The rotary actuator 130 pivots about the bearing 132 when current is passed through the voice coil 134 and pivots in an opposite direction when the current is reversed, allowing for precise positioning of the head 146 along the radius of the disk 120. The VCM 112 is coupled with a servo system (not shown) that uses positioning data read by the head 146 from the disk 120 to determine the position of the head 146 over tracks on the disk 120. The servo system determines an appropriate current to drive through the voice coil 134, and drives the current through the voice coil 134 using a current driver and associated circuitry (not shown).